

Work Order ID 76418

76418

Page 1

November-14-11 10:37:20 AM

Item ID: D205-634-041

Accept

N900040100

Setup Start ***NS1***

Revision ID:

Item Name: Replacement Skidtube

Stop ***NS2***

Start Date: 14/11/2011 Start Qty: 1.00

1

Cust Item ID:

Required Date: 28/11/2011 Req'd Qty: 1.00

1

Customer:

Reference:

Approvals: Process Plan: M.L.J Date: 11/11/14

Tooling:

Date:

Run Start ***NR1***

QC: Date:

SPC (Y/N):

Date:

Stop ***NR2***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
--------------------------------	--------------------------	----------------------	---------	--------	--------------	---------------	---------------	------------------	----------------

Draw Nbr

Revision Nbr

D2580-041

Rev.E

100

0.00

100

DOCUMENT CONTROL

DC

Memo

0.00

Document Control

Photocopy D205-634 bluefile & type labels per PPP D205-634-041 CHG002

N/A

110

0.00

110

BENDING MACHINE - SKIDTUBES

CNC Bend 1

Memo

0.00

CNC Delta 100 Bender

1-Bend as per program D2580.C on CNC Bender and Folio 16

2-Cut tubes as per Dwg. D2580

3- scribe batch# in aft end of tube

12-01-11

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

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DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
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Stop ***NR2***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
--------------------------------	--------------------------	----------------------	---------	--------	--------------	---------------	---------------	------------------	----------------

120

0.00

120

Skidtubes

Memo

0.00

Skidtubes

1- Deburr ends and remove bending marks

2- Prepare tube for welding as per QSI 004

>

DP

12-1-10

130

QC5- Inspect part completeness to step on W/O

0.00

130

QC

Memo

0.00

Quality Control

1 0 BER-01-20

W/O:		WORK ORDER CHANGES					
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Run Start ***NR1***
Stop ***NR2***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
140		0.00							

140

Skidtubes

Skidtubes

Memo

0.00

1-Weld step D2576 as per Dwg. D2580 and QSI004
A/R Aluminum Rod *M119712*

BE 12-01-20

2-Grind welds on step as per Dwg D2580

B12/01/23

3-Weld spacers as per dwg D2580

A/R M119712

BE 12-01-20

3- *** N/A**** Insert D4202-1 spacer, swage as per QSI002 and trim/ grind
flush per QSI002 and dwg. Hold x-bolt with DT9701 Use tube expander 1/2
x17G to start expansion and finish with 1/2 x 18G to achieve dwg dimension.

4-Drill holes for wearplates using DT 8217 & DT8937 Open holes to 19/64",
adjust stopper not to hit web. Debur

B12/01/23

6-Drill pilot holes for aft cap using DT 8215 Open holes to 0.208". Debur

7-Drill pilot holes for Tow ring using DT8091, open to .640" and Debur

JC-Bor

DP 12-1-26

W/O:		WORK ORDER CHANGES					
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Stop ***NR2***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
150	QC10- Inspect visual per QSI004- ground welds	0.00							
150									
QC	Memo	0.00		81260127					
Quality Control									
160	QC5- Inspect part completeness to step on W/O	0.00							
160									
QC	Memo	0.00		81260127					
Quality Control									
170	Pressure Wash per QSI005 4.3	0.00							
170									
HandFinish	Memo	0.00							
Hand Finishing	Re-alodine tube as per QSI 005 section 4.1.2.1 do not acid etch and leave fwd cap out of solution.								

① *CF/M/12-1-21*

W/O:		WORK ORDER CHANGES					
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Stop ***NR2***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
180	White Gloss(Ref:4.3.5.1) per QSI005 4.3-Alum	0.00							
180									
Powdercoat									
Powder Coating									
W11A480									
	Memo								
	START TIME: 7:45	0.00							
	OVEN TEMPERATURE: 320	0.00							
	FINISH TIME: 8:15								
190	QC3- Inspect Part Finish	0.00							
190									
QC									
Quality Control	Memo	0.00							

1X J M / 12/01/30

1 J M 12/01/31

W/O:		WORK ORDER CHANGES					
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Required Date: 28/11/2011 Req'd Qty: 1.00

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Customer:

Reference:

Approvals: Process Plan: _____ Date: _____ Tooling: _____ Date: _____

Run Start ***NR1***

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Stop ***NR2***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
--------------------------------	--------------------------	----------------------	---------	--------	--------------	---------------	---------------	------------------	----------------

200

0.00

200

HandFinish

Hand Finishing

Memo

0.00

1-Install inserts & wearplates & Gaskets as per Dwg. D2580. Use a drop of Sikaflex on insert holes before installing wearplates

A/R Sikaflex-291 1119508Sikaflex expire date: 12/08

2-Coat D2594-3 O' rings with Petroleum Jelly and install on D2594-1 plugs as per Dwg D2580

3-Inspect for foreign object per QSI 024

4-Install 2855 Aft Cap as per Dwg D2580 and seal Fwd Step & Aft Cap with

Sikaflex. Clean excess adhesive

A/R Sikaflex-291 1119508Sikaflex expire date: 12/08

5-Wing Walk as per Dwg D2580 and QSI 005 4.4

Batch: 111201251 6 11 12/6/11

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Item Name: Replacement Skidtube

Start Date: 14/11/2011 Start Qty: 1.00

1

Cust Item ID:

Required Date: 28/11/2011 Req'd Qty: 1.00

1

Customer:

Reference:

Approvals: Process Plan: _____ Date: _____ Tooling: _____ Date: _____

Run Start ***NR1***

QC: _____ Date: _____ SPC (Y/N): _____ Date: _____

Stop ***NR2***

Sequence ID/ Work Center ID	Operation Description	Set Up/ Run Hours	Tool ID	Tool #	Plan Code	Accept Qty	Reject Qty	Reject Number	Insp. Stamp
210	QC5- Inspect part completeness to step on W/O	0.00							
210									
QC	Memo	0.00							
Quality Control	Inspect Aft Cap, Fwd Step and Wing Walk of work to Current Step Inspect for Foreign objects per QSI 024								
220	Packaging	0.00							
220									
Packaging	Memo	0.00							
Packaging	Identify and pack for shipping as per PPPD205-634-041 Location: _____ PPP Rev: _____								
230	QC21- Final Inspection - Work Order Release	0.00							
230									
QC	Memo	0.00							
Quality Control									

8/12/11

PP 76925

12/12/11

12/12/11

MF
12-02-02

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

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Parent Item: D205-634-041

D205-634-041

Parent Item Name: Replacement Skidtube

Start Date: 14/11/2011

Required Date: 28/11/2011

Start Qty: 1.00

Required Qty: 1.00

Comments: IPP Rev:N 02.08.28 FP was QC5 in Step 27; Added QC5 to Step 30
KJ IPP Rev P 10.02.19
per PAR09-043 EC verified by:DD
IPP Rev. O 06.02.28 Added paperwork EC
IPP Rev:P 07-07-09 SS Wearplates & Gaskets JLM IPP Rev:Q
10.12.01 as per chg003 DD verf:EC

Component Item ID/ Item Name	Replacement Item ID	Mfg/ Purch	Bin Item	Primary Location	Last Location	Route Seq ID	Unit of Measure	Qty on Hand	Qty per Kit	Total Qty	Qty Issued	Date Issued	Status
---------------------------------	------------------------	---------------	-------------	---------------------	------------------	-----------------	--------------------	----------------	-------------	--------------	---------------	----------------	--------

D4202-1 *D4202-1* Spacer	<i>D2579</i>	Manufactured	No			140	Each	492.0000	20	20			
---	--------------	--------------	----	--	--	-----	------	----------	----	----	--	--	--

Location

Loc Qty

Loc Code

LG002

492

66929

106

67129

196

67308

1

67430

140

72639

49

D2580-1 *D2580-1* 205 Skidtube bent detail		Manufactured	No			110	Each	5.0000	1	1			
---	--	--------------	----	--	--	-----	------	--------	---	---	--	--	--

Location

Loc Qty

Loc Code

LG

3

72965

1

75282

2

ST046

2

75284

2

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

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76418

Parent Item: D205-634-041

D205-634-041

Parent Item Name: Replacement Skidtube

Start Date: 14/11/2011

Required Date: 28/11/2011

Start Qty: 1.00

Required Qty: 1.00

D2576-3 Manufactured No

140 Each 112.0000 1 1

D2576-3

Step (maching detail)

**

BE12-020

Location

Loc Qty

Loc Code

LG

112

66156

12

70883

50

74136

50

D2855 Manufactured No

200 Each 10.0000 1 1

D2855

Cap

**

B75074 (x1) 12/01/31

Location

Loc Qty

Loc Code

FP007

10

65519

2

65569

8

AN3-5A Purchased No

200 Each 912.0000 2 2

AN3-5A

Bolt

**

12/01/31

Location

Loc Qty

Loc Code

ST350

912

115371

46

117423

366

118626

300

119355

200

AN960JD10L NAS1149D0332J Purchased No

200 Each 0.0000 2 2

***AN960.ID10I ***

Washer

**

M119042 (x2) 12/01/31

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

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Parent Item: D205-634-041

D205-634-041

Parent Item Name: Replacement Skidtube

Start Date: 14/11/2011

Required Date: 28/11/2011

Start Qty: 1.00

Required Qty: 1.00

ALS7-1032-130

Purchased

No

200

Each

1,985.000

50

50

ALS7-1032-130

**

M119084 (x50) M 12/01/31

Insert ~~ALS4-1032-130~~

Location

Loc Qty

Loc Code

ST281

113

117717

27

118966

86

ST282

1872

119530

1872

AN3C4A

Purchased

No

200

Each

2,163.000

50

50

AN3C4A

**

M119749 (x50) M 12/01/31

BOLT

Location

Loc Qty

Loc Code

ST350

2163

117313

2

117688

5

117872

22

118112

16

118451

2

118706

142

118838

974

119328

1000

AN960C10L

~~NAS1149C0332~~

Purchased

No

200

Each

0.0000

50

50

***AN960C10I ***

washer

**

M119736 (x50) M 12/01/31

W/O:		WORK ORDER CHANGES					
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Parent Item Name: Replacement Skidtube

Start Date: 14/11/2011

Required Date: 28/11/2011

Start Qty: 1.00

Required Qty: 1.00

D3566-13

Manufactured No

200 Each

30.0000 1 1

D3566-13

Gasket

**

M 12/6/13

Location

Loc Qty

Loc Code

FP

29

73322

29

Y1

FP014

1

68341

1

D3566-5

Manufactured No

200 Each

30.0000 1 1

D3566-5

Gasket

**

M 12/6/13

Location

Loc Qty

Loc Code

FP002

30

74387

8

75069

22

Y1

D3566-1

Manufactured No

200 Each

33.0000 2 2

D3566-1

Gasket

**

B76942 (x2) M 12/6/13

Location

Loc Qty

Loc Code

FP002

31

73303

5

74518

26

FP015

2

68924

2

D3564-11

Manufactured No

200 Each

5.0000 1 1

D3564-11

Wearshoe

**

B77614 (x1) M 12/6/13

Location

Loc Qty

Loc Code

FP019

5

73146

5

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Parent Item Name: Replacement Skidtube

Start Date: 14/11/2011

Required Date: 28/11/2011

Start Qty: 1.00

Required Qty: 1.00

D3564-13

Manufactured No

200 Each

17.0000 1 1

D3564-13

Wearshoe

**

B75045 (x1) MU 12/01/31

Location

Loc Qty

Loc Code

FP001

16

73323

16

FP017

1

71594

1

D3564-9

Manufactured No

200 Each

16.0000 1 1

D3564-9

Wearshoe

**

B77613 (x1) MU 12/01/31

Location

Loc Qty

Loc Code

FP

11

73345

11

FP019

5

67590

4

69943

1

D3564-5

Manufactured No

200 Each

22.0000 1 1

D3564-5

Wearshoe

**

B76269 (x1) MU 12/01/31

Location

Loc Qty

Loc Code

FG

2

34806

2

FP001

12

74543

12

FP19

8

73330

8

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Parent Item Name: Replacement Skidtube

Start Date: 14/11/2011

Required Date: 28/11/2011

Start Qty: 1.00

Required Qty: 1.00

D2594-3

Manufactured No

200 Each

736.0000 16 16

D2594-3

O-Ring, 205 Skidtube

**

12/01/31

Location

Loc Qty

Loc Code

FP004

198

73490

198

FP-A

538

65518

41

66952

199

73490

298

x16

D2594-1

Manufactured No

200 Each

352.0000 16 16

D2594-1

Plug, 205 Skidtube

**

B76075 (x16) 12/01/31

Location

Loc Qty

Loc Code

FP

352

73401

352

W/O:		WORK ORDER CHANGES					
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LIST OF MATERIALS					
ITEM	QTY -041	QTY -045	QTY -047	PART NUMBER	DESCRIPTION
1	X			D2580-041	SKIDTUBE ASSEMBLY
2		X		D2580-045	SKIDTUBE ASSEMBLY
3			X	D2580-047	SKIDTUBE ASSEMBLY
4	1	1	1	D2500-1-190	EXTRUSION
5			16	D2570	BUSHING
6	1	1	1	D2576-3	STEP
7	20	24	25	D2579	SPACER
8	16	16	8	D2594-1	PLUG
9	16	16	8	D2594-3	O-RING
10	1	1	1	D2596	205 WEB
11	1	1	1	D2855	AFT CAP
12	1	1		D3564-5	WEARSHOE
13	1	1		D3564-9	WEARSHOE
14	1	1		D3564-11	WEARSHOE
15	1	1		D3564-13	WEARSHOE
16	2	2		D3566-1	GASKET
17	1	1		D3566-5	GASKET
18	1	1		D3566-13	GASKET
19			1	D4406-041	WEARPLATE ASSEMBLY
20			1	D4406-043	WEARPLATE ASSEMBLY
21	50	50		ALS7-1032-130 or AKS7-1032-130 or AKS4-1032-130 or AELS-1032-130	INSERT
22	50	50		AN3C4A	BOLT
23	2	2	2	AN3-5A	BOLT
24			8	AN4-45A	BOLT
25	50	50		NAS1149C0332R	WASHER (AN960C10L)
26	2	2	2	NAS1149D0332J	WASHER (AN960JD10L)
27			8	MS21042-4	NUT (OR MS21042L4)

GENERAL NOTES:

- 1) MATERIAL: N/A
- 2) FINISH: CHEMICAL CONVERSION PER DART QSI 005 4.1 PRIOR TO INSERTING D2596 WEB
POWDER COAT ASSEMBLY (-041/-047) GLOSS WHITE (REF 4.3.5.1) PER DART QSI 005 4.3
POWDER COAT ASSEMBLY (-045) GREEN SANDEX (REF 4.3.5.8) PER DART QSI 005 4.3
BLACK ANTI-SKID PAINT AS INDICATED PER DART QSI 005 4.4.
- 3) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED.
- 4) UNITS: INCHES UNLESS OTHERWISE NOTED.
- 5) BREAK SHARP EDGES: 0.005 TO 0.010 MAX.
- 6) IDENTIFICATION: NONE
- 7) WEIGHT: D2580-041 = 34.5 lbs
D2580-045 = 34.5 lbs
D2580-047 = 37.7 lbs
- 8) WELDING PER DART QSI 004.
- 9) INSERT D2596 WEB TO LOCATION SHOWN OFF AFT END OF SKIDTUBE AND BOND WEB INTO OUTER TUBE WITH NON-STRUCTURAL SIKAFLEX-241 ADHESIVE PER DART QSI 015 BEFORE BENDING. ENSURE HOLES LINE-UP.
- 10) BEND AS A SMOOTH RADIUS STARTING WITH A MAXIMUM CENTERLINE RADIUS OF 60 AND ENDING WITH A MINIMUM RADIUS OF 30. A MAXIMUM REDUCTION OF 0.200 IN DIAMETER IS ALLOWABLE IN THE BENT PORTION OF THE TUBE.
- 11) USE DART DRILL TEMPLATE DT8217 & DT8937 ONLY FOR D2580-041/-045 TO LOCATE AND DRILL Ø0.297 HOLES FOR WEARSHOE INSERTS. INSTALL ALS7-1032-130 PER SECTIONS B-B AND F-F (50 PLACES) AFTER FINISH. INSTALL AN3C4A BOLTS AND NAS1149C0332R WASHERS WITH SIKAFLEX-241/291.
- 12) INSERT D2594-1 PLUG C/W D2594-3 O-RING IN HOLES MARKED 'P' (BOTH SIDES OF TUBE) AFTER FINISH (16 PLACES FOR D2580-041/-045 AND 8 PLACES FOR D2580-047)
- 13) IT IS ACCEPTABLE TO GRIND A RELIEF IN THE D2855 AFT CAP TO PREVENT INTERFERENCE WITH THE SPACER AT THIS LOCATION

SHOP COPY

RETURNED

ENGINE

UNCONTROLLED COPY

SUBJECT TO DOCUMENT

WITH NO CE

WORK ORDER

NO. 76418

M.C.J.

11/11/14

RELEASED

2011-08-29

WD

E	ADD D2580-047 (ZN C4-7) AND D2580-7 (ZN B3-8); INCLUDED DEO D2580-D-1; REFORMATTED DRAWING TO CURRENT STANDARDS; DT8217 & DT8937 WAS TD2577-205 (ZN C4-1)	RF	11.06.21
D	CHANGE TO SS WEARPLATES AND GASKETS, INCLUDE DEO 9124/ 9183	PH	07.04.05
C	REDRAWN, INCLUDED DEO 9094/ 9097	CP	98.08.26
B	AS MANUFACTURED	DS	96.12.02
A	NEW ISSUE	DS	96.09.16
REV.	DESCRIPTION	SY	DATE
DESIGN	#	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
DRAWN	RF		
CHECKED	AP	DRAWING NO.	REV. E
MFG. APPR.	AS	D2580	SHEET 1 OF 8
APPROVED	AP	TITLE	SCALE
DE APPR.	AS	205 SKIDTUBE ASSEMBLY	NTS
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W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

W/O:		WORK ORDER CHANGES					
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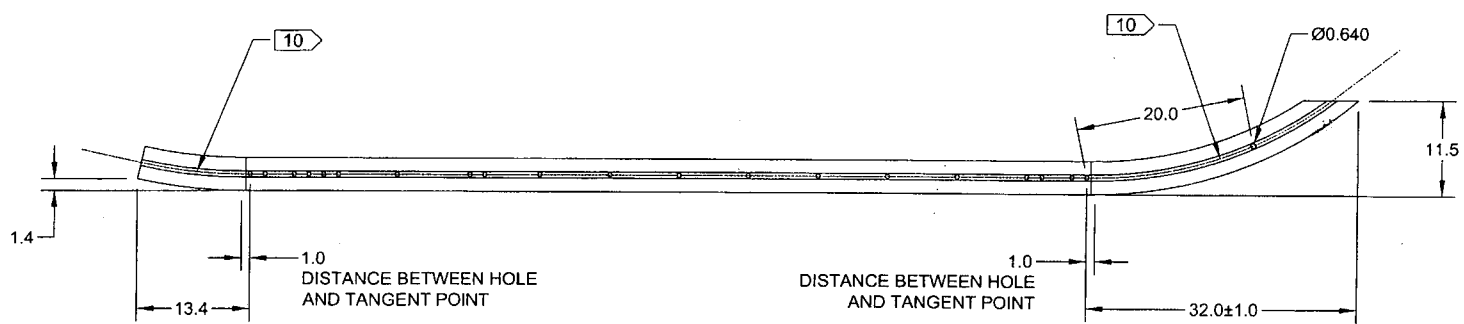
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			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

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D2580-1 BENT TUBE
(MAKE FROM D2580-101 TUBE)

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DRAWN	RF	HAWKESBURY, ONTARIO, CANADA	
CHECKED	RF	DRAWING NO.	REV. E
MFG. APPR.	RF	D2580	SHEET 3 OF 8
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Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

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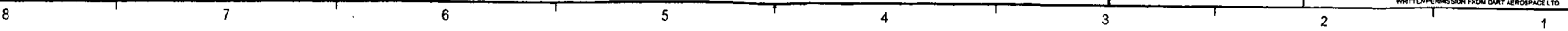
A horizontal line with 8 tick marks labeled 1 through 8 from right to left.



C



A



C

B

A

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

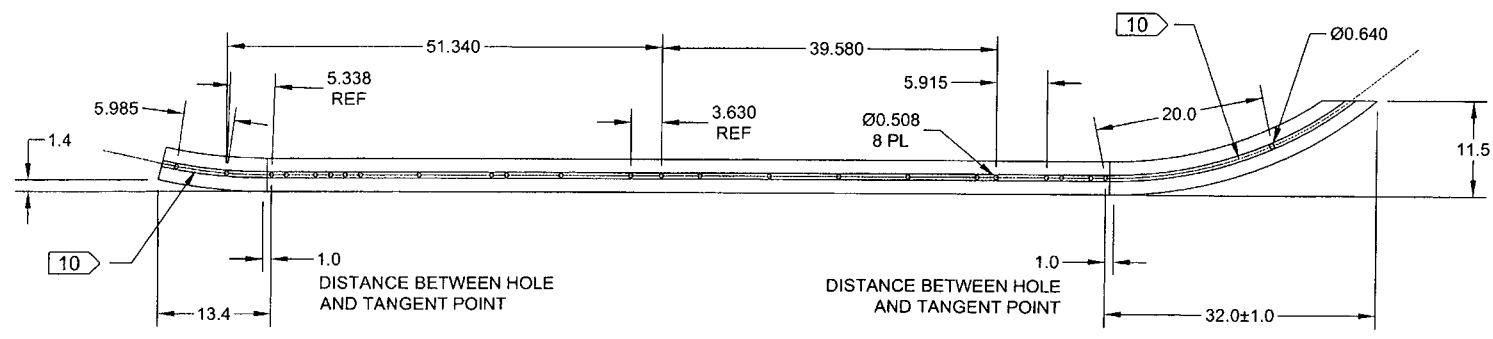
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Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

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			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

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D2580-5 BENT TUBE
(MAKE FROM D2580-101 TUBE)

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2011-08-29

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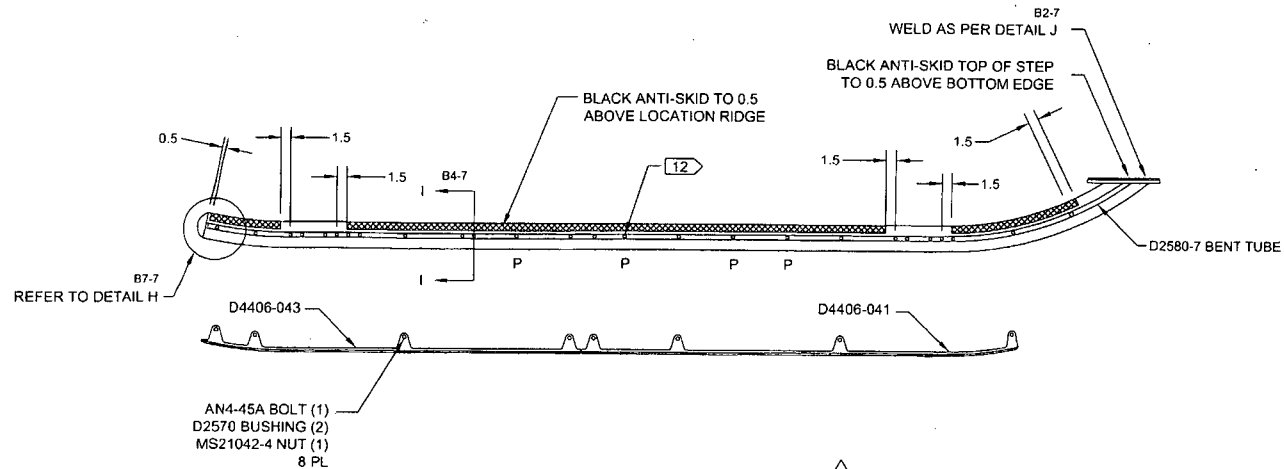
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Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

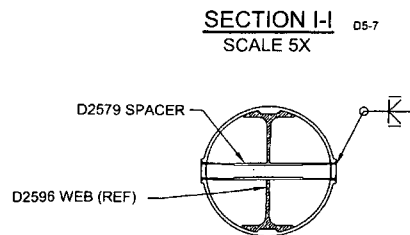
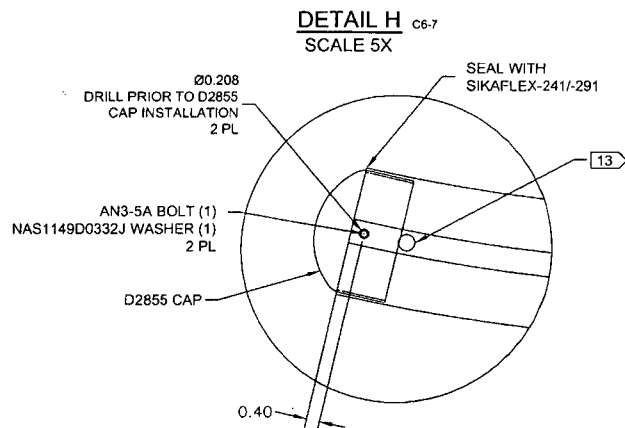
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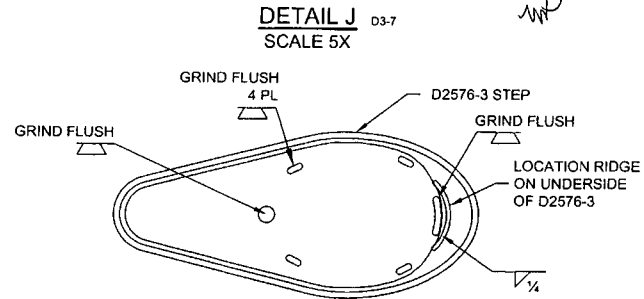


D2580-047 ASSEMBLY DETAIL E



AFTER DRILLING AND BENDING ASSEMBLY
PERFORM THE FOLLOWING FOR Ø0.508 HOLES ONLY:

1. CHAMFER HOLE 0.050 X 45°
2. INSERT D2579 SPACER (25 PLACES)
3. WELD INTO PLACE AND GRIND FLUSH
4. C'BORE D2579 SPACER TO Ø0.437 X 1.00 DEEP



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			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

8 **7** **6** **5** **4** **3** **2**



$\triangle E$

RELEASE
2011-08-29

DESIGN	1	DART AEROSPACE LTD	
DRAWN	RF	HAWKESBURY, ONTARIO, CANADA	
CHECKED	10	DRAWING NO.	REV. 1
MFG. APPR.	10	D2580	SHEET 7 OF 7
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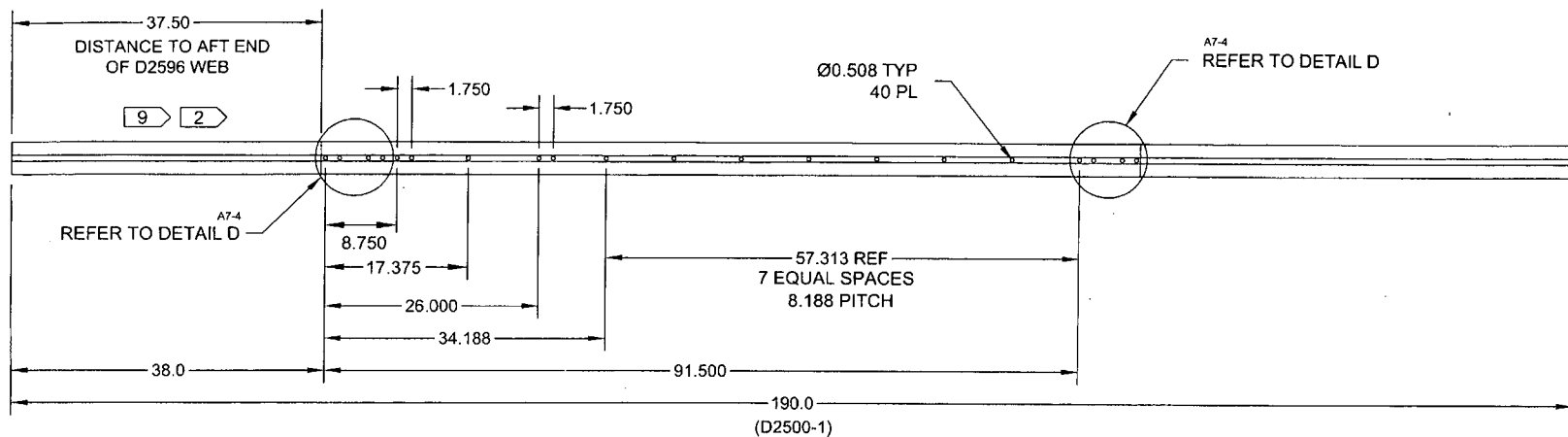
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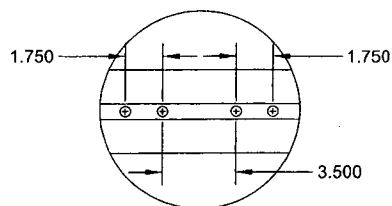
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D2580-101 TUBE



DETAIL D D3-4
C7-4
SCALE 5X

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2011-08-29

DESIGN	#	DART AEROSPACE LTD	
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NOTE: Date & initial all entries

NO. 280

AWS D17.1.2001
QUALIFICATION TEST RECORD

Name: Barclay Elliott
Job number: 78496
Part number: D205-634-141
Description: SKID tube
Welding Process: Tig[☒] Mig[]
Base material: Alum
Current: AC[☒] DC[]

TEST REQUIREMENTS AND RESULTS

Visual: pass[☒] fail[]
Penetration: pass[☒] fail[]

UNACCEPTABLE

Cracks: pass[☒] fail[]
Undercut: pass[☒] fail[]
Pin holes: pass[☒] fail[]
Overlap (cold lap): pass[☒] fail[]
Porosity (surface): pass[☒] fail[]
Coloration: pass[☒] fail[]

Qualifier David Ayud Date of Test Coupon 12.01.11

Welder Barclay Elliott Date of Test Coupon 12.01.11

The above named individual is qualified in accordance with AWS D17.1.2001 to weld